Thank you for your report dated 22 July 2022 titled 'Review of PMCR – Draft Technical Report'. Please see our response below.

Section 2.1

CSV welcomes the reviewer's comments regarding the reasonableness of the methodology. We also acknowledge your comment on the simplicity and usability of the PMCR.

Regarding the "potential undesirable artefact of the PMCR", it is correct that:

- Case 1: If a building with IFSCAN 1 and the cladding could compromise the sole exit of the building, cladding removal is required.
- Case 2: If a building has the IFSCAN 2 and the cladding does not pose a risk of evacuation to the building's sole exit, a partial or full cladding retention may be possible.

We do not see this as a systematic issue since case 1 involves the risk of compromising evacuation for all occupants in the building (beyond the single SOU with combustible cladding) while the combustible cladding in case 2 potentially impacts occupants in the cluster (i.e. two apartments). Further assessment of the cluster in case 2 may lead to other interventions to allow the retention of cladding. The building in case 2 must also be assessed against the impact on that building's sole exit, which was inherently stated in the case's statement above.

Section 2.2

CSV acknowledges the reviewer's comment on the quantification of risk associated with CP buildings and SB buildings. We have further developed the quantification since the time of the review, with the target of identifying the additional fire risk that combustible cladding in the CP building would add to the base risk of the SB building. As the target of PMCR is to reduce the additional fire risk owing to combustible cladding, other risks of the building are "isolated" in PMCR. Other non-compliant features of the building need addressing by the MBSs in addition to PMCR. This isolation is necessary to make PMCR simple and usable for its practical use by MBSs to allow the direct address of the cladding risks.

In terms of the performance solutions in SB that could potentially reduce the "safety margin" of the SB building, we would like to re-affirm that any performance solution would need to justify its compliance, i.e. meeting the performance requirements according to the relevant NCC clauses or at least equivalent to the DtS provisions. Following this comment, CSV conducted a comprehensive review of all performance solutions used in our building cohort and analysed their potential influence on the proposed set of interventions in PMCR. Additionally, each

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proposal in CSV for an individual building is reviewed by a registered fire safety engineer to mitigate the potential impact of existing performance solutions in that subject building.

Regarding the reviewer's comment on "cladding risk premium" in the last paragraph of this section, CSV agrees with your view on the different "benchmark" of risks between the DtS provisions and the performance requirements of the NCC (BCA). We may not agree with the "true compliance" concept since a "philosophical" lower benchmark of DtS provisions is still a legal benchmark in Australia and it is out of CSV's jurisdiction to rectify this gap.

Section 4

CSV welcomes the reviewer's comment on the overall classification of 13 interventions. Since the review, CSV has further developed through our progressive understanding and knowledge of cladding rectification.

Point 1

CSV agrees with the reviewer's comment. CSV has then adjusted the PMCR design that this intervention is only obligatory in certain circumstances where the proximity of an external fire source poses a threat to combustible cladding on the ground floor.

Point 2

CSV agrees with the reviewer's comment regarding penetrations where passive fire protection (i.e. fire box) should be prioritised over small area of cladding removal considering the invasive nature of cladding removal relative to the potential fire size of penetrations.

Point 3

CSV takes this comment as the malfunctioning of low-voltage lighting. Further investigation was conducted after the reviewer's comment. In one of the tests conducted by RMIT University, where the polymer core of ACP (with mainly polymer content) is exposed to different heat fluxes, the ignition would need a consistent heat flux over the threshold in a certain exposure time (see D02 – Supporting package 2 of PMCR). A low-voltage lighting may not provide this consistent heat output, and, therefore, was considered in this intervention.

Point 4

One of PMCR's major principles is ensuring that occupants can safely evacuate the building if there is a cladding fire. As long as this condition is met, PMCR does not require additional actions with other exits. Having said that, PMCR assigns a minimum set of requirements to rectify cladding risk, and the owners would act further, i.e. conduct further enhancement methods on additional exits as they see fit. This enhancement is not part of PMCR requirements.

CSV welcomes the reviewer's comment on the threat barriers. Regarding the possible gaps in designing interventions:

Gap 1

CSV acknowledges the reviewer's comment on the role of other combustible materials in façades. Following your comments, CSV has conducted multiple research and testing work in this area to further identify the actual contributory impact of cladding vs. other combustible materials (particularly, combustible insulations). This work has been reviewed for the 2025 Interflam Conference, where the dominant influence of combustible cladding over insulations was concluded.

Gap 2

CSV acknowledges the reviewer's comment on cavity barriers. We value the use of cavity barriers in preventing/slowing the fire spread. However, the scope of PMCR is limited to 2 SOUs (or 7 SOUs in sprinkler-protected buildings). Cavity barriers were not an intervention in PMCR since the application of cavity barriers as an intervention will require construction work (as acknowledged by the reviewer), which provides a low benefit-to-cost proposition. CSV fully supports the use of cavity barriers in the rectification of those building in the "high risk" category where a performance solution supports the partial removal of cladding and uses cavity barriers to prevent fire spread between the non-cladded and cladded areas.

General aspect

CSV agrees with the reviewer's comment on the potential of cladding ignition before the flashover within the associated SOU. This aspect is embedded in the design of IF-SCAN where any openings in proximity to combustible cladding must be considered. Additionally, further work developed in the Bayesian network's fire spread model utilises a more realistic fire scenario, generated by NIST and published on their website. This approach allows cladding ignition at points earlier than flashover which aligns with the reviewer's comment.

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